FOOD FADS, FACTS, AND FANCIES

by Helen S. Mitchell[1]

QUACKS are with us still, and they do a thriving business. Today they use a scientific lingo that often sounds almost like the real article. Here is an exposition of the ways of the quack, the faddist, and the unscrupulous advertiser of food nostrums who prey on a gullible public.

THE MEDICAL or food quack is one of the most pernicious influences scientific nutrition has to meet. The food quack today uses many of the same devices, modernized, that the patent-medicine vendor used a generation ago. The quack of former days was so crude in his statements that the modern consumer wonders how people ever could have believed such buncombe. Even today there is plenty of flagrant chicanery, but the more scientific modern quack or the unscrupulous advertiser often couches his remarks in such technical language as to inspire false confidence.

The typical quack food lecturer or pseudo health promoter usually has poise, personality, and persuasion, which assure him of a hearing and a goodly number of converts. The letters usually found after his name may represent a fake degree given by a third-rate institution, sometimes founded for the express purpose of conferring the degree, or a bona fide degree given by a reputable institution whose professional and ethical standards he has long since forsaken. His pseudo-scientific explanations of nutrition and physiology abound in quotations from authentic sources, sometimes misinterpreted but sometimes used correctly along with misleading statements to give the whole an air of authority. The insidious mixture of the true and false is always more difficult to interpret correctly than the glaringly false. The clever quack is well aware of popular interest in science and works accordingly. Of all quacks the food-fad promoter is the most prolific because he gets the biggest following and his is a profitable business. He makes converts faster than scientific knowledge can be broadcast, because the scientist is conservative and tries to be accurate, while he is quite the opposite.

Be skeptical of mail-order solicitations and cheap advertising of nutrition nostrums or disease cures. Reliable products will find a market through ethical channels. Be skeptical of extravagant claims.

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The consumer's best protection against fraudulent advertising is a fundamental knowledge of nutrition obtained from reliable sources. Bogert (*133*) [2] has aptly expressed the nutritionist's attitude toward this problem in general:

> The fact is that food fads flourish because people want them. It makes little difference to the food faddist whether the particular dietary cult he follows incorporates a few grains of truth along with the dross or not; he is attracted to this cult because it satisfies some craving to try a novel dietary, to be in fashion, to attract attention by being unusual in diet, or from the desire to *do something* about his health. He may benefit by the simpler diet, more regular living, and especially through the belief that he will be helped, but this proves nothing as to the theories on which the cult is based, and the same results might have been more painlessly attained by other means. The food faddist represents a psychological type and often drifts from one dietary cult to another; as long as we have this type of people in such large numbers, diet fads and cults will persist and will be profitable to their originators.

FOOD ADVERTISING

Legitimate and reliable advertising of food products is of real service to the public and deserves encouragement on this basis alone, aside from its necessity for successful competition in the commercial field. The intelligent consumer welcomes reliable information but should be disgusted with extravagant and untrue statements. Many false notions and misapprehensions regarding the magic health value of certain foods and the mysterious dangers in specific food combinations have been introduced or initiated by unscrupulous advertisers or propagandists.

Health testimonials are an all too common form of food advertising and are especially deceptive when given by people unqualified to express a scientific opinion. An academic title of Doctor or M. D. used in advertisements or testimonials is no assurance of their authoritative nature but is an unethical device often used by quacks and fakers. It is often implied or stated that a product is approved or recommended by physicians, health authorities, nurses, dietitians, or hospitals when this is not actually the case. Beware of extravagant testimonial endorsements and general health claims.

Some so-called educational food advertising presents pseudoscientific information on the nutritional or physiologic values of foods in an artfully misleading and insidiously deceptive manner. Exaggeration by implication that all the nutritive values reside in a single food or undue emphasis on the nutritional or physiologic values of any one food is a form of deception.

The larger and more ethical food companies today are supporting scientific research and are putting out valuable educational material that is welcomed by teachers of nutrition. But even the best of educational advertising naturally stresses the products of the company concerned. Otherwise it would not pay to advertise.

SCOPE OF NUTRITION FADS AND FRAUDS

A recent bulletin entitled "Facts, Fads, and Frauds in Nutrition" (*804*) classifies and summarizes some of the more popular fads and frauds with opinions expressed by recognized authorities concerning each. This bulletin helps the layman to answer for himself questions regarding extravagant and misleading nutritional propaganda.

[2] Italic numbers in parentheses refer to Literature Cited, p. 1075.

VAGUE HEALTH CLAIMS

Both the Food and Drug Administration and the Committee on Foods of the American Medical Association have been emphatic in condemning the extravagant and misleading use of the terms "health foods," "healthful," and similar expressions. The same unwarranted claims made for patent medicines a few decades ago are made today by the manufacturers of "health foods." Weird concoctions of ground alfalfa or dried vegetables, inorganic salts, and flavoring are foisted on the public as panaceas for every conceivable ailment, real or imaginary.

The Committee on Foods is explicit in defining the proper use of the terms "health," "healthful," and "wholesome" (*20*):

> The term *health food* and equivalent claims or statements to the effect that a food gives or assures *health* are vague, misinformative and misleading. An adequate or complete diet and the recognized nutritional essentials established by the science of nutrition are necessary for health, but health depends on many other factors than those provided by such diet or nutritional essentials. No one food is essential for health; there are no *health foods*. Statements of well-established nutritional or physiologic values of foods are permissible.
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> The term *healthful* is frequently encountered in food advertising. As used, it commonly means that the food described corrects a possible nutritive deficiency or some abnormal condition in such a manner as actively to improve health. It incorrectly implies that the food possesses unique (or unusual) health-giving properties. The term has a popular specific *health food* significance which makes its use in advertising misinformative and misleading.
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> *Healthful* and *wholesome* by dictionary definition have almost identical meanings; the former, however, intimates an active significance, whereas, the latter signifies quality or condition. *Wholesome* indicates that a food so described is sound, clean, fit for consumption, and free of any objectionable qualities; it is appropriate for characterizing foods fulfilling these qualifications and should replace *healthful* as used in food advertising.

Vague health claims are frequently accompanied by equally vague use of the terms "balanced" or "scientifically balanced" foods. No one food is expected to be eaten alone, and no one food can insure that the diet will become balanced.

The misuse of the word "energy" is also popular along with other vague health claims. Most common foods yield chemical energy available for use by the human body. The use of this term in defining the fuel value of a food should not be confused with the popular and erroneous use signifying vitality, strength, vigor, or endurance. Some perfectly wholesome foods such as cereals have been widely advertised as perfectly balanced, health-giving, or energy-producing foods. Criticism of such advertising is not a criticism of the food as such but of the misleading statements made about it.

WEIGHT-CONTROL CLAIMS

Because the question of body weight is of general interest today, weight-reducing claims make a popular appeal. There are three types of reducing regimes which are or have been popular and should be recognized in their true light by the layman. (1) The true metabolic stimulants are the most dangerous; (2) the laxative salts and drugs are futile if not harmful; (3) the food supplements with recommended dietary regimes are usually harmless but may be fraudulent in their therapeutic claims.

The metabolic stimulants most commonly employed are some form of thyroid extract or the drug dinitrophenol. Both are dangerous in

the hands of the layman, and the latter has been known to be the cause of cataract in several cases. Whether or not the ingredients of a proprietary compound are stated on the label, many people do not read labels intelligently and dangerous stimulants should not be used promiscuously in drug or food preparations.

Laxative salts and cathartic drugs are often incorporated in so-called reducing foods with accompanying claims that weight reduction may be accomplished without dietary control. The sudden weight reduction is due to loss of water in the stools, not loss of body fat, and both the water and the resulting weight will be promptly regained as soon as water is consumed. Furthermore, permanent injury to the digestive tract may result from such drastic but futile treatment.

The specific or proprietary food supplements with a recommended dietary base their entire success upon the dietary, which in some cases is quite satisfactory. The food supplement or concentrate is not essential to the reducing program outlined, but the layman is led to believe it is.

Quick aids to gaining weight are not so numerous as the reducing products but are equally futile and misleading. Unless food intake exceeds daily energy expenditure there can be no surplus for storage as body fat. This physiologic law holds for both the overweight and the underweight and should be the basis for evaluating any weight-control claims.

MINERAL AND ALKALIZING FOODS

There is something mysterious and rather intriguing about the mineral requirements of the human body. The scientist is seeking to solve some of the mysteries, but the quack claims he has solved them and proceeds to enlighten the gullible layman on the magic powers of some mineral food mixture. Some advertisers would lead the reader to believe that the average person is suffering from serious mineral deficiencies that can be made good only by the proprietary or natural food advertised. Smatterings of truth are so intermingled with falsehood as to give the claim a semblance of truth. Iron, iodine, and calcium, as well as a whole list of other minerals, are featured in such propaganda.

Acidosis is always prominent among the dangers listed as resulting from mineral deficiencies. The scare method is used in depicting the dire consequences of an "acid system" and its widespread occurrence. Actually, acidosis is a rather rare condition of the blood; it is not a common disease or symptom because the normal body has the necessary mechanism for disposing of both excess acids and excess alkalies. Money spent in treating such imaginary ailments is usually wasted. When true acidosis accompanies some other disease it is a problem for medical management.

VITAMIN THERAPY

Exploitation of vitamin foods has been more common even than mineral propaganda. Popular interest in vitamins may be partly the cause and partly the result of the extensive advertising of vitamins. The subject is nutritionally important and deserves attention from the consumer to the extent of seeing that the vitamin content of his daily diet is adequate. The use of more fruits, vegetables, and whole-

grain products is to be encouraged, and the fortification of certain foods with vitamin concentrates may be desirable in the case of a vitamin that is not widely distributed in nature. A discussion of the pros and cons of legitimate vitamin fortification of foods is not in place here, but certainly the exploitation of the public with indefinite and general vitamin claims is to be discouraged. Such claims mean nothing when the specific vitamins and the quantity of each factor present are not indicated. For a more detailed discussion of legitimate vitamin claims the reader is referred to the bulletin previously mentioned (*804*).

FOOD COMBINATIONS

Several different food-combination fads have been promoted by self-styled nutrition experts and endorsed by thousands of unwary converts. There is no physiologic foundation for the belief that the various constituents in natural foods cannot be digested satisfactorily when eaten together at one meal. Rehfuss (*954*) has given us definite proof that proteins and carbohydrates are not incompatible, nor does an acid fruit interfere with the digestion of starch. Leporsky (*681*) has demonstrated that a combination of meat and vegetables may stimulate a better flow of digestive juices than either food alone. None of the dire consequences predicted as a result of eating a so-called wrong combination actually materialize in the experience of millions who boldly disregard such warnings. Persons who have tried one of these new systems of eating and who claim to have been helped thereby may unknowingly have made other drastic changes in their dietary habits. The possible benefit seemingly derived from any of these regimes may arise from the fact that the variety of foods eaten is an improvement over the previous diet—more fruits and vegetables, perhaps—rather than the eating of them in a prescribed order or combination.

For further information on the futility and unscientific nature of these food-combination fads, two humorous but reliable discussions of the subject are recommended (*684*, *982*).

Partly digested or predigested foods are also of questionable value, because the carbohydrate ingredient is the one usually concerned in such proprietary products—the very one least likely to need predigesting. Claims regarding aids to digestion or natural digestive elements are also unwarranted.

DIETARY PANACEAS FOR VARIOUS DISEASES

Indigestion frequently attributed to acid stomach is the quack advertising lingo used for a number of digestive remedies or diet systems. The stomach is normally acid—necessarily so for adequate digestion of food. There is just as likely to be too little as too much acid in certain abnormal states, but careful diagnosis and medical advice are necessary in such cases. Yet the quack who encourages self-diagnosis and medication still persists in suggesting the serious results of acid stomach and offers "anti-acid," "relief of acid stomach," and "cures for acid indigestion."

Constipation may frequently be controlled by simple self-medication and laxative foods, but no attempt will be made here to discuss the relative merits or proper use of such remedies. There are certain

principles that should be understood, however, regarding the so-called laxative foods on the market. In general they fall into two classes—foods to which a cathartic drug has been added, and those that provide cellulose or some other form of bulk. The Food and Drug Administration considers phenolphthalein or any other such laxative drug as a harmful adulterant when it is used as an ingredient of a food. Constipation due to lack of bulk may yield to added roughage, but other types of constipation may be aggravated by similar treatment. Thus no food or form of cellulose can be rightly designated as a cure for constipation.

Diabetes, arthritis, kidney troubles, high blood pressure, and many other chronic diseases are listed in quack propaganda as curable by some specific food or dietary regime. False hopes of cure lead even intelligent persons into futile search for the impossible.

FOOD LEGENDS AND NOTIONS

Some harmless and amusing food legends and dietary notions have been handed down from generation to generation; others appear as neighborhood gossip. In one of the best popular food articles of recent date (*1*) the author comments:

> More food notions flourish in the United States than in any other civilized country on earth, and most of them are wrong. They thrive in the minds of the same people who talk about their operations; and like all mythology, they are a blend of fear, coincidence, and advertising.

LEGAL AND EDUCATIONAL ATTACK ON NUTRITION FADS AND MISLEADING ADVERTISING

The new Food, Drug, and Cosmetic Act passed in 1938 is not so effective in checking false and misleading advertising as could have been desired. It is more effective than the old Food and Drugs Act in the control of labeling, it authorizes factory inspection, and it provides for certain standards that will weed out some of the more fraudulent products. But it is still inadequate for prompt action against advertising of false or misleading nature.

Educational attempts to protect the public against false and misleading propaganda are successful only in part. Much of the informative material along this line is published in journals or bulletins not readily available to the layman. Popular interpretation of scientific discovery is apt to be conservative, while the pseudo scientific is promoted by the most spectacular devices. The psychological appeal of the latter is obviously stronger except to the well-informed person who is capable of reading between the lines. It therefore behooves the consumer to develop a reasonable degree of skepticism as well as sales resistance in respect to extravagantly advertised health foods and nutrition claims. This skepticism should be based upon a knowledge of fundamental facts, however, because it is all too easy for the layman to go to the opposite extreme and doubt everything he reads or hears. The Council on Foods of the American Medical Association publishes from time to time General Decisions that have been adopted for the guidance of the members and of the public, food manufacturers, and advertising agencies. These decisions are revised periodically as scientific progress warrants and are published in convenient booklet form (*20*) available to the public upon request.